

67,200-262; TSMC 99-545  
Serial Number 09/588,788

### REMARKS

Favorable reconsideration of this application in light of the above amendments and the following remarks is respectfully requested.

Claims 1-8 are pending in this application. Claim 1 is amended herein. No claims have been allowed.

#### *Claim Rejections - 35 U.S.C. § 102*

The Examiner has rejected claims 1-8 under 35 U.S.C. § 102(b) as being anticipated by Esper et al. (U.S. Patent No. 4,613,843; hereinafter "Esper") or Wollnik (U.S. Patent No. 4,187,485).

Applicant acknowledges the teachings of Esper and Wollnik as cited by the Examiner.

x ( In response, applicant has amended claim 1 to provide that applicant's series of spirals within applicant's planar spiral conductor layer is formed with a continuous variation in at least one of: (1) a series of linewidths of the successive series of spirals; and (2) a series of spacings separating the successive series of spirals.

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Support for this limitation newly incorporated into amended claim 1 is found within applicant's specification within the paragraph bridging pages 10-11.

Applicant asserts that the foregoing limitation is not present within either Esper nor Wollnik.

Thus, since each and every limitation within applicant's invention as disclosed and claimed within amended claim 1 is not disclosed within Esper or Wollnik, applicant asserts that amended claim 1 may not properly be rejected under 35 U.S.C. § 102(b) as being anticipated by Esper or Wollnik.

Since all remaining claims within this application are dependent upon amended claim 1 and carry all of the limitations of amended claim 1, applicant additionally asserts that those remaining claims may also not properly be rejected under 35 U.S.C. § 102(b) as being anticipated by Esper or Wollnik..

In light of the foregoing response, applicant respectfully requests that the Examiner's rejection of applicant's claims 1-8 under 35 U.S.C. § 102(b) as being anticipated by Esper or Wollnik be withdrawn.

#### ***Other Considerations***

The Examiner has cited no additional prior art of record not employed in rejecting

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applicant's claims to applicant's invention.

No fee is due as a result of this amendment and response.

### SUMMARY

Applicant's invention as disclosed and claimed within amended claim 1 is directed towards a method for fabricating an inductor structure comprising a planar spiral conductor layer, wherein a successive series of spirals within the planar spiral conductor layer is formed with a continuous variation in at least one of: (1) a series of linewidths of the successive series of spirals; and (2) a series of spacings separating the successive series of spirals. Absent from the prior art of record employed in rejecting applicant's claims to applicant's invention is a disclosure or each and every limitation within applicant's invention as disclosed and claimed within claim 1.

### CONCLUSION


On the basis of the above amendments and remarks, reconsideration of this application, and its early allowance, are respectfully requested.

Any inquiries relating to this or earlier communications pertaining to this

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application may be directed to the undersigned attorney at 248-540-4040.

Respectfully submitted,

  
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**APPENDIX**  
**COMPLETE COPY OF THE CLAIMS**  
**(MARKED-UP WITH CURRENT REVISIONS)**

1. A method for fabricating an inductor structure comprising:
  - providing a substrate;
  - forming over the substrate a planar spiral conductor layer to form a planar spiral inductor, wherein a successive series of spirals within the planar spiral conductor layer is formed with a continuous variation in at least one of:
    - a series of linewidths of the successive series of spirals; and
    - a series of spacings separating the successive series of spirals.
2. The method of claim 1 wherein by employing within the successive series of spirals within the planar spiral conductor layer the variation in at least one of the series of linewidths of the successive series of spirals and the series of spacings separating the successive series of spirals, the planar spiral inductor is fabricated with an enhanced Q value.
3. The method of claim 1 wherein the substrate is employed within a microelectronic fabrication selected from the group consisting of integrated circuit microelectronic fabrications, ceramic substrate microelectronic fabrications, solar cell optoelectronic microelectronic fabrications, sensor image array optoelectronic microelectronic fabrications and display image array optoelectronic microelectronic fabrications.

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4. The method of claim 1 wherein the successive series of spirals is formed in a shape selected from the group consisting of a triangle, a square, a rectangle, a higher order polygon, a uniform ellipse, a non-uniform ellipse and a circle.
5. The method of claim 1 wherein the planar spiral conductor layer is formed of a conductor material selected from the group consisting of non-magnetic metal, non-magnetic metal alloy, magnetic metal, magnetic metal alloy, doped polysilicon and polycide conductor materials, and laminates thereof.
6. The method of claim 1 wherein the variation in the series of linewidths of the successive series of spirals is an increasing progression of linewidth from a first spiral which defines the center of the planar spiral inductor having a comparatively narrow linewidth to a final spiral which defines the perimeter of the planar spiral inductor having a comparatively wide linewidth.
7. The method of claim 6 wherein the comparatively narrow linewidth is from about 7 to about 10 microns and the comparatively wide line width is from about 17 to about 21 microns.
8. The method of claim 1 wherein the successive series of spirals comprises from about 1 to about 8 spirals.
9. - 15. (Canceled)